Diabetes among Persons under 20

Type 1 diabetes was previously referred to as juvenile-onset diabetes. Type 1 diabetes develops when the body can no longer produce insulin to regulate blood glucose. Type 1 diabetes usually develops in children and young adults, though it can occur at any age. There is no known way to prevent type 1 diabetes.

Type 2 diabetes was previously referred to as adult-onset diabetes, and while it is rare among children, rates of diagnosis are increasing. Among adults, type 2 diabetes accounts for 90-95% of all cases of diabetes. Type 2 diabetes begins as insulin resistance, in which cells do not use insulin properly. The body gradually loses the ability to produce insulin. Type 2 diabetes is associated with older age, obesity, physical inactivity, family history of diabetes, and race/ethnicity.

Currently, there is no data source in Virginia from which to accurately estimate the prevalence of type 1 or type 2 diabetes among children or adolescents. Nationally, the Centers for Disease Control and Prevention (CDC), estimate the following:

- 0.26% of persons under age 20 have type 1 or type 2 diabetes. Applying this estimate
 nationally, 215,000 persons under age 20 have type 1 or type 2 diabetes. Applied to Virginia,
 4,868 persons under age 20 have type 1 or type 2 diabetes.
- Type 2 diabetes can occur in children/adolescents and is being diagnosed more frequently, although it is still very rare.
- Incidence of type 1 diabetes was highest among white children/adolescents (24.8 per 100,000 per year for children under 10; 22.6 per 100,000 per year for 10-19 years).
- Type 2 diabetes was very rare among children under 10. For children/adolescents between 10-19 years, rates were higher among minority populations than among white children/ adolescents.

Sources:

CDC National Diabetes Fact Sheet, 2011: http://www.cdc.gov/diabetes/pubs/pdf/ndfs 2007.pdf
SEARCH for Diabetes in Youth Project: http://www.searchfordiabetes.org/public/provider/index.cfm